

ABSTRACT OF THE DISCLOSURE

5 A body is at least partially coated with one or more refractory layers of which at least one layer is of a fine grained κ - Al_2O_3 . Said κ - Al_2O_3 layer has equiaxed grains with an average grain size of $<0.5 \mu\text{m}$. The Al_2O_3 layer also has at least one sublayer containing Al, Si and O. The fine grained κ - Al_2O_3 microstructure is obtained by periodically introducing a silicon halide, preferably SiCl_4 , during the Al_2O_3 -process.